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Department of Energy

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MAY 13 1998

DOE-0767-98

Mr. Gene Jablonowski, Remedial Project Manager
U.S. Environmental Protection Agency
Region V, SRF-5J
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

Mr. Tom Schneider, Project Manager
Ohio Environmental Protection Agency
401 East 5th Street
Dayton, Ohio 45402-2911

Dear Mr. Jablonowski and Mr. Schneider:

RESPONSE TO THE U.S. ENVIRONMENTAL PROTECTION AGENCY AND OHIO ENVIRONMENTAL PROTECTION AGENCY COMMENTS ON THE DRAFT SILOS 1 AND 2 ACCELERATED WASTE RETRIEVAL REQUEST FOR PROPOSAL

References:
1) Letter, Jablonowski to Reising, "Technical Review Comments on Silos 1 and 2 Accelerated Waste Retrieval Project, Part 6, Statement of Work, and Part 7, Technical Requirements Document," dated April 23, 1998.

2) Letter, Schneider to Reising, "Silos 1 and 2 AWR SOW," dated April 14, 1998.

Enclosed for your information are responses to the referenced comments on the Request for Proposal (RFP) for the Silos 1 and 2 Accelerated Waste Retrieval (AWR) Project. The necessary revisions to the RFP in response to your comments, as well as comments received from the stakeholders, are being incorporated into the final RFP.

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If you have any questions, please contact me at (513) 648-3139.

Sincerely,

Johnny Reising

FEMP: Akgündüz

Johnny W. Reising
Fernald Remedial Action
Project Manager

Enclosure: As Stated

cc w/enc:

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ACCELERATED WASTE RETRIEVAL RFP
RECORD OF
BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
1	4/23/98	4/27/98	general		X

Comment: The statement of work (SOW) cites the technical requirements document (TRD) excessively, which limits the usability of the SOW. Almost every page of the SOW cites the TRD at least once, and many pages have numerous citations of the TRD. The numerous citations of the TRD make reviewing the SOW cumbersome. Future SOWs should include all relevant text so that the SOWs are complete, stand-alone documents.

Response: The SOW provides a "road map" through the document to the reader. In order to facilitate references to the TRD requirements, specific Section numbers are referenced in the SOW in order to direct the reader to the appropriate requirements. These references enhance the ability to understand the scope and requirements in the RFP is reviewed as a whole.

Resolution:

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
2	4/23/98	4/27/98	Part 6, Section 1.2, page 6-6		X

Comment: The text states that the soil waste retrieval system will transfer residues, BentoGrout™, and heels from Silos 1 and 2 into temporary transfer tanks. The text, however, does not define the term "heels." The text should be revised to identify the heel material.

Response: **Change** Part 6, Section, 1.3, first bullet, first paragraph, second sentence as follows: "...BentoGrout™, and heel[x] material..."
AND Add a footnote (appropriately numbered in place of the "x") to the page to read as follows " [x] Throughout this document, the term 'heel' will be used to describe the residue that is located in the area where the silo floor meets the silo vertical side wall and due to physical properties, may be a significant challenge to mobilize and retrieve from the silos." PCL

Resolution:

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Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
3	4/23/98	4/27/98	Part 6, Section 2.2, Page 6-7		X

Comment: Paragraph 2 states that "the Contractor must use the preconceptual design for the Phase 1, RCS (radon control system) which is being provided by FDF (Fluor Daniel Fernald)." The paragraph further states that "when the Contractor uses any of the FDF design information (including the RCS Phase 1), the Contractor shall validate, certify, and assume all responsibilities for this design and any modifications." It is not clear whether the contractor is required to use the preconceptual design information or the actual design. If the contractor must use FDF's design, the contractor should not be held responsible for it. However, if the contractor is given a choice of using FDF's or someone else's RCS design and the contractor selects FDF's design, then the contractor can be held responsible for it. Requiring the contractor to use FDF's RCS design and making the contractor responsible for it will likely increase the overall project cost in order to account for the contractor's increased liability. This situation can be avoided by allowing the contractor to select the RCS design. The text should be re-evaluated and revised accordingly.

Response: This Text has been revised to allow the Contractor the option of selecting the RCS design as follows:

The schedule for the RCS Phase 1 is very critical to the AWR project. Therefore, FDF has provided RCS Phase 1 design and Government furnished equipment (GFE) information provided in **Part 7, Section 4.0** and **Part 7-TRD, Appendix F**, which the Contractor may elect to use to support this schedule. If the Contractor uses any part of the FDF design information or study results provided in **Part 7, Section 4.0** and **Part 7-TRD**, the Contractor shall validate and certify the resultant design. The Contractor shall be responsible for the total design regardless of the source of the design information."

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
RECORD OF
BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
4	4/23/98	4/27/98	Part 6, Section 3.16.2.1, page 6-11 and 12		X

Comment: The text states that "water that can not be treated at the Advanced Wastewater Treatment System (AWWT) shall be treated by the Contractor prior to discharge." The text should be revised to identify where the treated water is to be discharged. If the treated water is to be discharged to the AWWT, it should first be analyzed to verify that the discharge will not cause an exceedance of the AWWT's National Pollutant Discharge Elimination System (NPDES) permit requirements. Moreover, the text should discuss the treated water's disposition in the event that the analytical results indicate that its discharge to the AWWT would cause such an exceedance. In addition, the NPDES permit requirements should be included in a table or appendix in the SOW.

Response: **Change** the last sentence of 3.16.2.1 to read: "Flush water will be managed in accordance with the wastewater requirements specified in TRD section 2.3.2.2."

All waste water will be discharged through the AWWT, however some waste water may require pretreatments.
As required by the wastewater requirements specified in the TRD, flush water from system closure activities will be collected, sampled and analyzed prior to discharge to the AWWT. If the analytical results indicate that the flush water cannot be sufficiently treated by the AWWT to meet NPDES permit requirements, then the contractor will be required to provide pretreatment, prior to discharge to the AWWT.
The NPDES permit is specifically identified in the Technical Requirements listing at the beginning of Section 7 of the RFP.

Resolution:

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
5	4/23/98	4/27/98	Part 6, Section 5.1, Page 6-23		X

ACCELERATED WASTE RETRIEVAL RFP
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Comment: The text states that "the contractor is responsible for any pretreatment of waste water prior to transfer to the AWWT." The text then cites Section 2.3.2.2 of the TRD as containing "wastewater system" requirements. As discussed in Comment #4, the text should describe the wastewater's disposition in the event that analytical results indicate that its discharge to the AWWT would cause an excedance of NPDES permit requirements.

Response: Section 2.3.2.2 of the TRD requires the contractor to supply projected wastewater flow and pollutant concentration data as part of the design package. FDF will utilize these data to evaluate the capability of the AWWT to provide sufficient treatment to meet all requirement of the FEMP NPDES permit, as well as the DCGs specified by DOE Order 5400.5. If this evaluation indicates that the AWWT will be unable to provide sufficient treatment, the contractor will be required to provide sufficient pretreatment, prior to discharge to the AWWT, such that discharges from the AWWT will meet all requirements.

Resolution:

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
6	4/23/98	4/27/98	Part 6, Section 6.2, Page 6-36 through 52		X

Comment: Submittal due date codes K, T, and U are missing from Exhibit 6.2. Code K is associated with the (1) exit checklist, (2) fuel storage tank, (3) portable structure sketch, and (4) portable structure anchoring system. Code T is associated with the submittal register. Code U is associated with (1) samples, (2) material certifications, and (3) laboratory test reports. Exhibit 6-2 should be revised to include the submittal due dates for Codes K, T, and U.

Response: Exhibit 6-2 included all the information but do to a formatting error at the time the blue sheet review copy was printed, the submittal codes K, T, & U did not appear on the printed pages. The formatting error has been identified and corrected and the rest of the document reviewed for similar formatting errors.

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
RECORD OF
BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
7	4/23/98	4/27/98	Part 7 TRD, General comment		X

Comment: The text states that any wastewater created as a result of the accelerated waste retrieval (AWR) process will be staged for treatment at the AWWT. However, it is not clear whether waste materials associated with Silos 1 and 2 would be amenable for treatment at the AWWT. Section 5.1 of the SOW for the AWR project states that the AWWT was designed to remove only uranium from wastewater. According to Appendix A of the TRD, the silos contain actinium, polonium, thorium, and radium at high activities. Although the contractor will be required to perform any necessary pretreatment of the wastewater before its discharge to the AWWT, it is not clear whether this pretreatment would be sufficient to allow the wastewater to be treated at the AWWT. Additional information regarding the feasibility of treating AWR wastewater containing Silo 1 and 2 constituents should be presented to clarify this matter.

Response: Section 2.3.2.2 of the TRD requires the contractor to supply projected wastewater flow and pollutant concentration data as part of the design package. FDF will utilize these data to evaluate the capability of the AWWT to provide sufficient treatment in to meet all requirement of the FEMP NPDES permit, as well as the DCGs specified by DOE Order 5400.5. If this evaluation indicates that the AWWT will be unable to provide sufficient treatment, the contractor will be required to provide sufficient pretreatment, prior to discharge to the AWWT, such that discharges from the AWWT will meet all requirements.

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
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Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
8	4/23/98	4/27/98	Part 7 TRD, General		X

Comment: The text discusses gross decontamination of the silos, decant sump tank, and process equipment after all materials have been removed. However, the end result of the decontamination effort is ambiguous. The acceptable level of total contamination (both fixed and removable) remaining after decontamination and the disposition of decontaminated equipment should be clearly stated in the TRD.

Response: The sole purpose of the gross decontamination is to prepare the Silos and AWR SSC's for D&D. The gross decontamination will bring the Silos and AWR SSC's into safe shutdown conditions (removing any loose contaminates). The OU4 ROD specifies that the Silo structures will be dispositioned in accordance with the OU3 ROD. According to the OU3 Integrated Remedial Design/Remedial Action (IRD/RA)Work Plan, May 1997, ". . . each above-grade project implemented under the OU3 integrated remedial action will generate a project-specific Radiological Requirements Plan (RRP) having special conditions particular to the components being remediated. . ." The extent of surface contamination is determined on a project-specific basis.

Decontamination method(s), based on Specification 01517 of the IRD/RA and the RRP (which together provide direction to the remediation subcontractor on performance standards and other conditions that must be met), will be proposed prior to initiating demolition of the Silo structures. The final acceptable contamination levels for release of materials from the area will be established based on several factors including worker protection, levels reasonably expected to be achieved using aggressive decontamination practices, regulatory limits, etc. In accordance with the OU3 IRD/RA, an implementation plan for D&D of the OU4 Complex, which identifies the appropriate radiological decontamination limits, will be submitted to U.S. EPA prior to initiating demolition. These final decontamination limits will be compared to the levels present in the Silos prior to demolition in order to determine if additional decontamination measures are necessary beyond those completed as part of the AWR project.

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
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BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
9	4/23/98	4/27/98	Part 7 TRD, Sec 2.2.1.4, pg 8		X

Comment: Function 1.4 deals with collection of residue samples. The text states that one of the objectives will be to prevent radon releases. However, it is not clear whether this objective applies to the sampling process, the samples, or some other item. The text should be reviewed to clearly state what this objective is associated with.

Response: Remove the text "preventing radon releases, " from the second sentence in Section 2.2.1.4. In fact, function 1.4 intends only to identify those elements that define the Collect Samples function. Function 2.0, Control Radon, is applied to all SSCs associated with the AWR Project (as stated in this section), and will cover this activity.

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Resolution:

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
10	4/23/98	4/27/98	Part 7 TRD, Sec 2.2.7, pg 12 to 14		X

Comment: The contractor is required to provide a full-sized mock-up facility using Silo 4 in order to demonstrate the AWR process. However, some important elements of the demonstration have been omitted from the text. In particular, this section should be revised to discuss **A)** sample acquisition, **B)** facility and equipment decontamination, **C)** a method to demonstrate decant sump system removal, and **D)** placement of shielding to protect workers.

ACCELERATED WASTE RETRIEVAL RFP
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Response: **A)** Sample acquisition has been added to the Full-Scale Mock-Up System (FSMS) requirements FSMS-013 which reads: "Obtain a sample of the AWR surrogate during operation of the FSMS utilizing the sampling system installed to comply with requirement SWRS-020."
B) Facility and equipment decontamination has been added to each of the system requirements. For the FSMS system requirement FSMS-006 reads as follows: "Provide a means to simulate the decontamination of equipment that comes into contact with silos residue."
C) The decant sump comment, as stated, refers to "...system removal...". The removal of the decant sump is not part of this Contract. The contractor is only required to perform gross decontamination of the sump. Refer to DWRS system requirement DWRS-003 that reads as follows: "Provide a means to decontaminate any equipment that contacts the Decant Tank residues prior to removal of the equipment from site." and DWRS-008 that reads as follows: "Ensure that design provides for ease of decontamination and demolition at the end of Stage 2 operations." The Full-Scale Mock-Up was not developed to include the decant sump. There is no decant sump in the area of Silo 4 and there were no provisions to "mock-up" this evolution. Currently the decant sump is pumped down periodically therefore based on past practice and sump pumping is standard industrial practice there is no specific requirement to demonstrate Decant sump waste removal during the FSMS.
D) The Full-Scale Mock-Up is to demonstrate all SSC's used during the Silo Waste Retrieval process. If the Contractor need shielding he may have to demonstrate on Silo #4 during the Full Scale Mock-Up

Resolution:

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Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
11	4/23/98	4/27/98	Part 7 TRD, Table 2-2, pg 18		X

Comment: (1) The text specifies a requirement to provide shielding on top of the silo domes in order to reduce radiation to 1 millirem per hour or less. It is not clear where this requirement originated. The text should be revised to cite a reference for this requirement. Furthermore, based on the structural integrity of the silo domes and the dose rates of the silo residue materials, it is questionable whether this requirement could be met. The text should be re-evaluated and revised accordingly. (2) In addition, Table 2-8 on Page 29 specifies a requirement that the top of the mock-up facility (Silo 4) have no more than 700 pounds of loading on top of the silo. Given this requirement, placing shielding above the silo domes may not be practical. This weight requirement should be reconsidered.

ACCELERATED WASTE RETRIEVAL RFP
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Response: (1) The requirement, as stated in Table 2-2, is to reduce radiation exposure levels in normally occupied areas to less than 1 mrem/hr when operating the retrieval system. This is consistant with 10 CFR 835, Occupational Radiation Protection, §835.1002, Facility Design and Modifications (a safety basis requirement document referenced in Section 2.4 of this document) which requires: *In addition to the design requirements stated in applicable codes and standards, control penetrating radiation levels to maintain worker and public radiation exposure ALARA. Provide sufficient engineering controls (e.g., shielding, access controls, remote operations) to ensure worker exposures to penetrating radiation in areas of continuous occupancy (2000 hrs/yr) are ALARA and less than 0.5 mrem/hr and as far below this average as reasonably achievable. For areas where the occupancy is expected to be less than continuous, controls will be sufficient to limit individual exposures to less than 1 rem/year and as far below that as reasonably achievable.* In the case of retrieval, it is estimated to take approximately one year to complete retrieval, with a nominal personnel occupancy factor of 50%.

(2) Silo dome loading, as referenced in the RFP, is restricted by safety requirements in OU4 safety basis documentation. Under no circumstances would installation of shielding be permitted to exceed the established load limits for the silo dome(s). The Contractor must ensure adequate engineering controls are inplace to satisfy the requirement(s) of Table 2-2. Most of the penetrating radiation will be mitigated by active radon treatment (to lower the headspace concentrations), however, shielding of overhead structures may be required. If this is so, the Contractor will design the shielding to be apart of their structure (e.g., no load imparted to the silo structure).

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
RECORD OF
BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
12	4/23/98	4/27/98	Part 7 TRD, Table 2-2, pg 19		X

Comment: The text specifies that 1 unit of residue will be collected for sampling purposes for every 1,000 units of residue transferred. Based on the estimated total waste volume in Silos 1 and 2, about 60 30-gallon drums of sample media would be collected. Although proper characterization of the silo materials is important for treatment and disposal purposes, this volume of sampling media appears to be excessive and should be reconsidered.

Response: Archive samples are being collected primarily to address the future K-65 material needs to directly support Pilot scale testing for final remediation if required. Although the amount of material required to support this effort is unknown, it is felt that this requirement should adequately address any future material needs.

Resolution:

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BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
13	4/23/98	4/27/98	Part 7 TRD, Table 2-10, pg 35		X

Comment: The text requires that activities in wastewater discharged from the AWWT not exceed the derived concentration guides (DCG) established in U.S. Department of Energy Order 5400.5. These DCGs are based on radioactivity levels in water that would represent 100 millirems of exposure per year to a human receptor using standard assumptions, and these levels are specified for individual radionuclides. However, these levels may not be protective of human health and the environment. To address this concern, further discussion should be presented regarding discharge of AWWT effluent containing multiple radionuclides.

Response: DOE Order 5400.5 specifies that, when evaluating discharges containing multiple radionuclides, the sum of each individual radionuclide's fraction of its DCG shall be evaluated. If the sum of the fractions is less than or equal to 1, then the treatment being provided is considered adequate.
Section 2.3.2.2 of the TRD provides the Waste Water system requirements and AWWT limitation (See Text below).

2.3.2.2 Wastewater System

Liquid effluents may be produced within the AWR facilities as a result of residue transfer or other activities. The generation of liquid wastes produced as a result of operations shall be minimized. Where technically and economically feasible, liquid wastes shall be recycled. Material handling systems shall be provided for handling these liquid effluent streams. All liquid residues discharged from the Contractor's facility shall be staged for characterization prior to transfer to the FEMP Advanced Wastewater Treatment (AWWT) facility. The Contractor shall obtain all required samples and analytical facilities for characterization. All wastewater discharges at the FEMP, including those from the AWWT, are covered by an existing ~~National Pollutant Discharge Elimination System~~ (NPDES) Permit. ~~All~~ Wastewater generated during ~~discharged from~~ the AWR Project shall be discharged via a 4 inch tie in to an existing line that feeds the headworks of the AWWT (Section 2.5.4).

ACCELERATED WASTE RETRIEVAL RFP
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Response: Continued

There are no fixed pretreatment criteria for wastewater discharged to the AWWT. Any water used for residue retrieval shall be treated for BentoGrout™ removal prior to release. To determine whether the process wastewater would need additional pretreatment, mass balance data for rate of wastewater generation, and types and concentrations of constituents in the wastewater expected to be discharged during the process (including radon) shall be submitted as part of the design package. An evaluation of the mass balance data will indicate whether additional pretreatment will be needed. Intentional dilution, as a substitute to treatment, shall not be allowed. Determining the acceptability of wastewater to the AWWT shall not be based on any dilution that results from the combination of stormwater with ~~thee~~ wastewater stream. If the data submitted during engineering design indicates ~~thethat~~ wastewater discharge would exceed the site treatment capabilities of the AWWT, pretreatment of the wastewater stream shall be required. Pretreatment shall most likely be required if the concentrations of dissolved Resource Conservation and Recovery Act (RCRA) heavy metals (e.g., arsenic, barium, cadmium, chromium, lead, or selenium) are excessive, due to their aquatic toxicity, and/or if concentrations of dissolved radon in the discharge present a health hazard to AWWT personnel.

Current criteria and guidance for wastewater discharges to the AWWT are identified in **Table 2-10**. Additional information concerning wastewater requirements are found under the regulatory requirements presented in **Appendix B** ~~to the TRD~~.

The Contractor's activities may be affected by any change in terms and conditions of the NPDES permit. Any required process modifications, or changes in the wastewater or stormwater control or monitoring requirements, deemed necessary shall be the subject of a directed change under the contract, unless it is a direct result of the actions of the Contractor.

Solids removed during pretreatment shall be transferred to the TTA.

Table 2-10 presents requirements for wastewater discharges necessary in the development of the ~~Wastewater System~~ (WWS).

Table 2-10 ~~WWS Wastewater System~~ Requirements

WWS-001 Ensure that no listed hazardous waste, as defined under RCRA, is discharged into the wastewater.

WWS-002 Ensure that project discharge of Total Suspended Solids (TSS) does not exceed 1,000 ppm, including BentoGrout™.

WWS-003 Monitor and report to FDF any project wastewater discharges for the following constituents: arsenic, barium, cadmium, chromium , lead, selenium, radium-226, thorium-230, total dissolved uranium, chloride, and nitrates.

WWS-004 Meter all project wastewater discharged with a flow measuring and recording device (or by known batch volume). Include measurement of total flow. Report data to FDF.

WWS-005 Stage all project wastewater for characterization prior to batch discharge to the AWWT (~~reference~~ Section 5.6).

WWS-006 Wastewater characterization, including analytical facilities, shall be the responsibility of the Contractor. Characterization data shall be submitted to FDF.

NOTE: For design and evaluation of pretreatment for wastewater discharge from the treatment process, the Contractor may assume that project wastewater will be commingled with 40,000 gallons of water per day prior to discharge to the receiving ~~water~~ body of water. This shall be taken into account in evaluation of pretreatment needs to meet the FEMP NPDES Permit, and DCGs of DOE Order 5400.5.

Resolution:

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Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
14	4/23/98	4/27/98	Part 7 TRD, Sec 5.9, pg 120		X

Comment: The text discusses berm excavation and possible disposal of the excavated material in the On-Site Disposal Facility (OSDF). Although a limit of 1,030 parts per million (ppm) uranium is included among the OSDF waste acceptance criteria (WAC), other isotopes have been identified in the silos that may not have been fully evaluated for on-site disposal. In particular, thorium-230, protactimium-231, and actinium-227 are present at high concentrations in the silos and may also be present in the berm material. Furthermore, the level of 1,030 ppm is based on uranium that exhibits a natural isotopic distribution. According to Table 2-18, some of the silo materials may exhibit enriched uranium distributions; therefore, higher activities on a weight (ppm) basis may be present. The text should be revised to present information regarding OSDF WAC levels for additional radionuclides and to discuss variable uranium isotopic ratios.

Response: Section 5.9 of the TRD has been revised to clarify the process for evaluating the silo berm material to determine acceptability for disposal in the OSDF.

Site-wide radiological Waste Acceptance Criteria (WAC) for the Onsite Disposal Facility (OSDF) were established for the Constituents of Concern identified in the Operable Unit 5 Remedial Investigation/feasibility Study (RI/FS). As part of the OU5 RI, potential COCs were screened based upon evaluation of COC-specific fate and transport characteristics and sitewide soil data, including specific data from the Silo 1 and 2 berms. As presented in Table F.3.5-2 of the OU5 RI, the specific radionuclides referenced in the subject comment were evaluated, using the highest detected soil values, in screening the COCs that form the basis for establishing site-wide radiological WAC for the OSDF in the OU5 FS. Specific WAC COCs for the silo berm material will be established in the Project Specific Plan (PSP) to be submitted to U.S. EPA and Ohio EPA prior to initiating excavation. Sampling will be conducted to verify that the excavated silo berm material meets the WAC for uranium and any other area-specific WAC COCs established in the PSP.

Resolution:

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Commentator/ Affiliation: US EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
15	4/23/98	4/27/98	Part 7 TRD, A.4		X

Comment: The text in Section A.4 does not appear to be entirely consistent with the tables in Section A.4.1. For Silo 1, the text suggests that water content increases with increasing depth in the silo. However, the data for the vertical sections taken from this silo suggest that the middle section (zone B) is driest, followed by the top (zone a) and then the bottom (zone c). Similarly, for Silo 2, the text states that zone B is much wetter that zone A. However, the data for vertical sections from Silo 2 suggest that Zone A is much wetter than Zone B; no data are provided for zone C. These discrepancies should be resolved.

Response: Insert the following text as the second paragraph in Section A.4 of Appendix A:

The moisture measured during particle size analysis in the 1989 sampling should not be considered in conflict with the general statements regarding moisture content increasing in the silos with depth for the following two reasons:

- The zones identified in the 1989 sampling represent the best understanding of where in the three zones the material was extracted from. However, given the small amount of material extracted from this sampling, the material should not be considered as representative of these specific locations (the result of the Vibracore tube becoming plugged during the sampling did not permit a representative core of K-65 material being extracted from these locations despite full penertration of the Vibracore into the silo).
- The moisture level (material) should be considered heterogeneous. The better defined zones in the 1991 sampling indicate this is so. For example, in sample 100070, a zone C sample has less moisture than another sample taken at zone B. These differences reflect the heterogenity in the moisture of specific samples from varying depths, but do not dimminish the overall trend of moisture content increasing as depth (into the silo) increases.

Resolution:

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Commentator/ Affiliation: Ohio EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
1	4/14/98				

Comment: Please provide information regarding how FDF will assure that the AWR project contractor will adhere to the SOW and other requirements. Will this be accomplished through inspections, documentation, meetings, etc.?

Response: In addition to inspections, documentation, and meetings the Contractor is required to build and successfully test a Full Scale Mock-up System that is identical and integral to the AWR system. The FSMS will be connected to Silo 4 and use a physical surrogate to verify the SWRS, TTA, and TWRS.

Resolution:

Commentator/ Affiliation: Ohio EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
2	4/14/98				

Comment: During the procurement process, preference should be shown to vendors that will construct facilities that are easily decontaminated and demolished with minimal waste generation

Response: Part 7-TRD, Section 2.3, System Requirements, has been enhanced to include a requirement for ease of decontamination in the design of each system. As part of the evaluation process FDF will evaluate the Offer proposal for AWR Life Cycle Cost. AWR Life cycle cost includes the AWR Total Project Cost and the impact cost of Decontamination and Decommision of the Offer's installed Structure, systems and components plus the future operating cost of the Offer's installed Structure, systems and components. Also the AWR Life Cycle Cost will evaluate any potential cost impacts the Offer's proposal would have on the Full-scale remediation project.

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
RECORD OF
BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: Ohio EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
3	4/14/98				

Comment: When selecting a contractor, DOE should show preference to vendors that can demonstrate systems that minimize any and all emissions, i.e. air (radon), wastewater, etc.

Response: Part 7-TRD, Section 2.3, System Requirements, includes requirements for emission limits relative to the design of each system that has a potential to produce emissions. Per several comments the Evaluation Criteria Table presented to the public on April 14, 1998 is being incorporated into the RFP Part 1. This table defines the high level criteria that the bids will be evaluated. The table defines waste water management criteria and criterion on the Contractor's RCS ability to meet the radon release design requirements.

Resolution:

Commentator/ Affiliation: Ohio EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
4	4/14/98		Pg. 6-8		

Comment: The text states that flush water that cannot be treated at the AWWT will be treated by the contractor prior to discharge. Will this open the possibility to the construction of an additional facility, however small, by the contractor to treat possible wastewater? Please provide further information regarding the generation and treatment of potential wastewater including coordination of flow with AWWT capacity.

Response: If the Contractors process produces wastewater that will not meet the AWWT WAC without being pre-treated, it is the intent of this contract to require the Contractor to design a system to provide this treatment process. However, without knowing the proposed process it has not been a specific requirement to design a pre-treatment system to treat wastewater. Part 7-TRD, Section 2.3.2.2 and Section 5.0 address the AWR wastewater issues. AWWT flow/capacity is also addressed in Part 7-TRD, Section 2.3.2.2.

Resolution:

ACCELERATED WASTE RETRIEVAL RFP
RECORD OF
BLUE SHEET REVIEW COMMENTS AND RESPONSES

Commentator/ Affiliation: Ohio EPA

Comment #	Date of Document:	Date Rec'd	Section / Page	Date/Resolved	SRC
5	4/14/98		Pg. 6-62		

Comment: DOE should consider including the policy stating a worker's right to stop work in this section.

Response: The issue regarding the right to stop work is addressed by the addition of the Workers Bill of Rights in Part 8 of this document.

Resolution: